

PC-Warrants Instructions

(Version 1.19.1)

March 20, 2013

DRAFT 3

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Summary

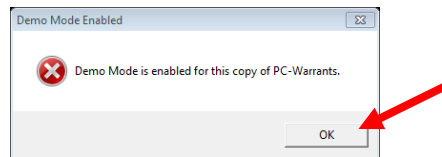
The older versions of PC-Warrants performed only cursory checks of input data and allowed users to override data discrepancies and/or omissions by forcing warrant evaluations with an "Evaluate Now" button. However, the newer versions of PC-Warrants no longer allow this override and require users to either enter the necessary data for the selected warrants, or unselect warrants to be evaluated, as needed. The following instructions provide information for users to set up the software, use the software for warrant analysis, and to address some of the more common error messages.

Section A: Installation and Set-Up

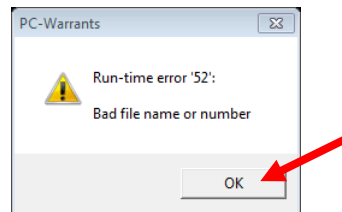
1. Have your administrator uninstall any older versions of PC-Warrants, if needed.
2. Have your administrator install version 1.19.1 from the PC-Warrants web site (there are separate download options depending on whether or not it is a new install or an upgrade):

<http://pc-warrants.com/Downloads/downloads.html>

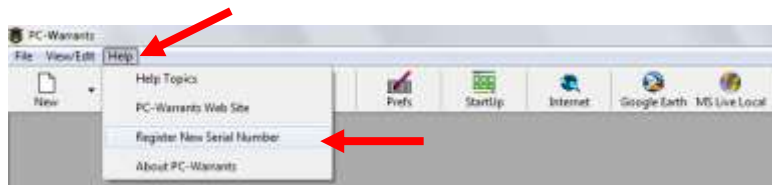
3. Open (double-click) the PC-Warrants icon.
4. If the program opens in “Demo Mode” click “OK”.



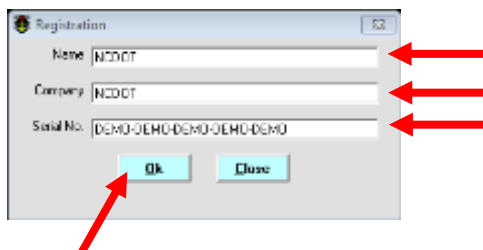
5. If error message “Run-time error ‘52’: Bad file name or number” displays then click “OK”, close PC-Warrants, and go to Section C (Run Time Error 52) for instructions on this error message. Otherwise, skip to step 6.



6. Click on “Help” and “Register New Serial Number”:



7. Enter “NCDOT” in the “Name” and “Company” fields and replace “DEMO-DEMO-DEMO-DEMO” with the actual serial number (serial numbers are site-specific and the same serial number can be used on every machine located at the same physical address). Click “OK”.



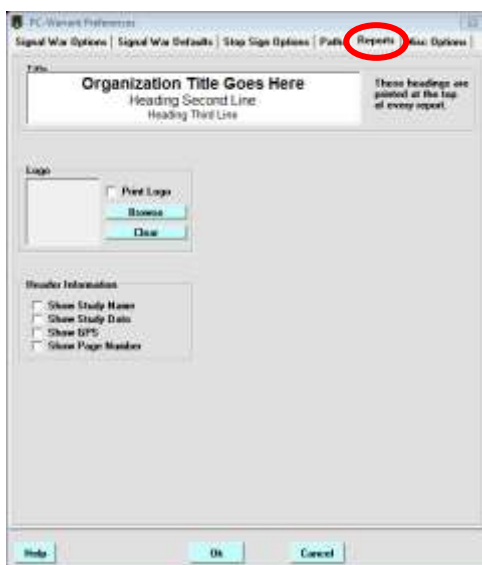
8. Click on “Define/Edit Program Preferences”:



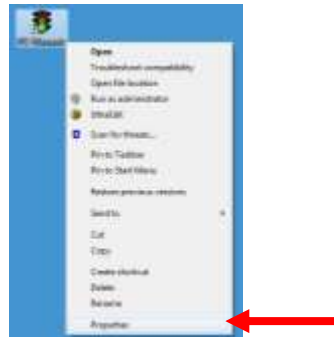
9. Uncheck everything after “Warrant 3 – Peak Hour” in the “Signal War Options” tab:



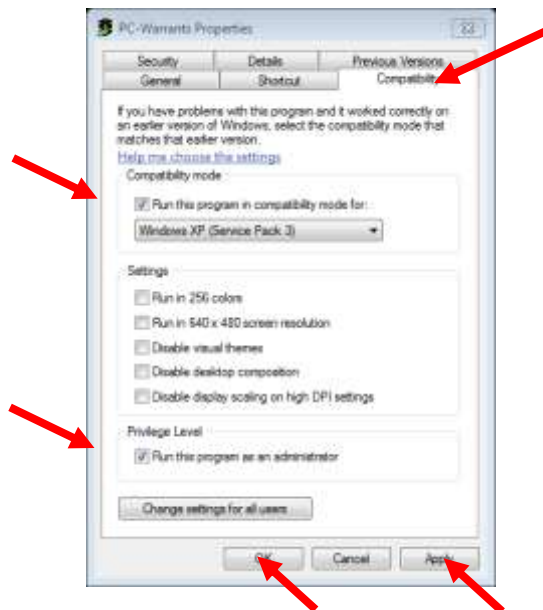
10. Click on the “Reports” tab, enter your default report title (this will print out on all warrant analyses), and check all the boxes in the “Header Information” section:



11. Click “Ok” (note that you can adjust preferences at any time and not just during installation).
12. Close PC-Warrants.
13. For computers with Windows 7 and 64-bit operating systems continue to step 14. Otherwise, go to step 16.
14. Right-click on the PC-Warrants icon and select “Properties”...



15. Click on the “Compatibility” tab, check the boxes for “Run this program in compatibility mode for:” and “Run this program as an administrator”, click “Apply”, and click “OK”.



16. PC-Warrants should now be ready to use.

Section B: Data Download and Warrant Analysis

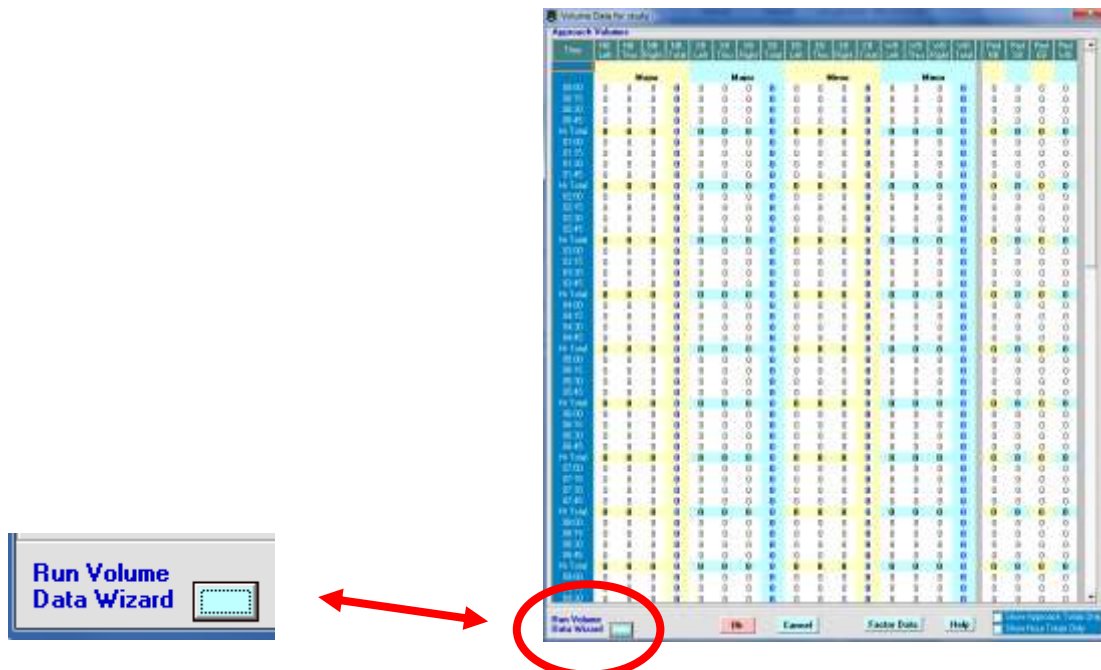
1. Save the PETRA Pro (PPD) file to somewhere other than your desktop (PC-Warrants will not open files from the desktop).
2. Open (double-click) the PC-Warrants icon.
3. Click on “Start a New Signal Warrants Study”...



4. Click on the gray button to the left of “Volume Data”...



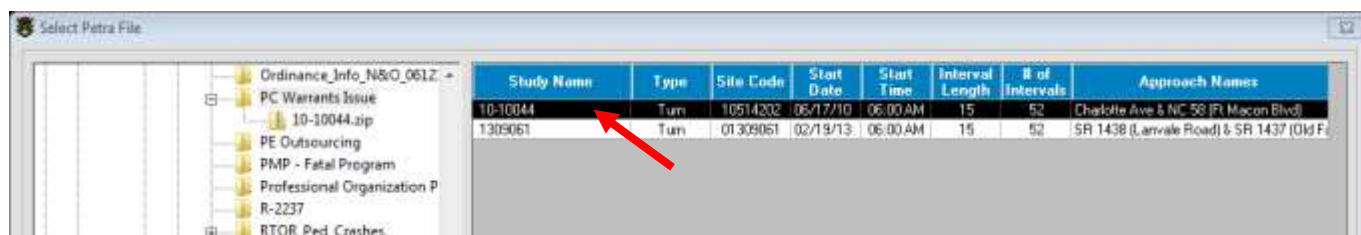
5. Click on “Run Volume Data Wizard”...



6. Click on “PetraPro”...



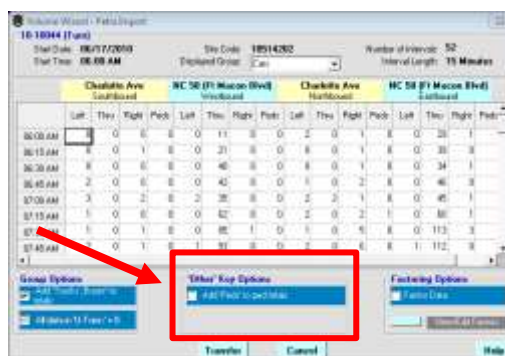
7. Find the desired PPD file and double-click on it (or highlight it and click the “Select” button)...



8. Make sure everything in the “Group Options” box is checked:



9. Make sure everything in the “Other Key Options” box is unchecked:



10. Click the “Transfer” button...



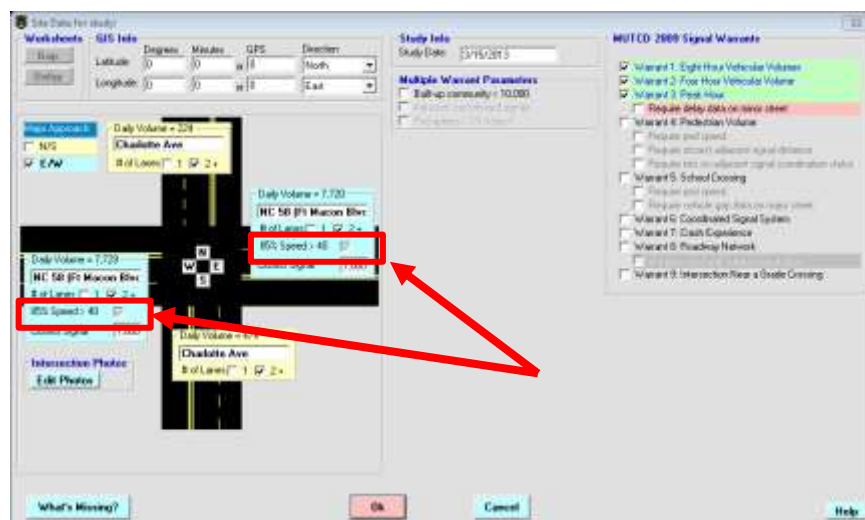
11. Count data is now in PC-Warrants. Close the “Approach Volumes” window by clicking “Ok”.



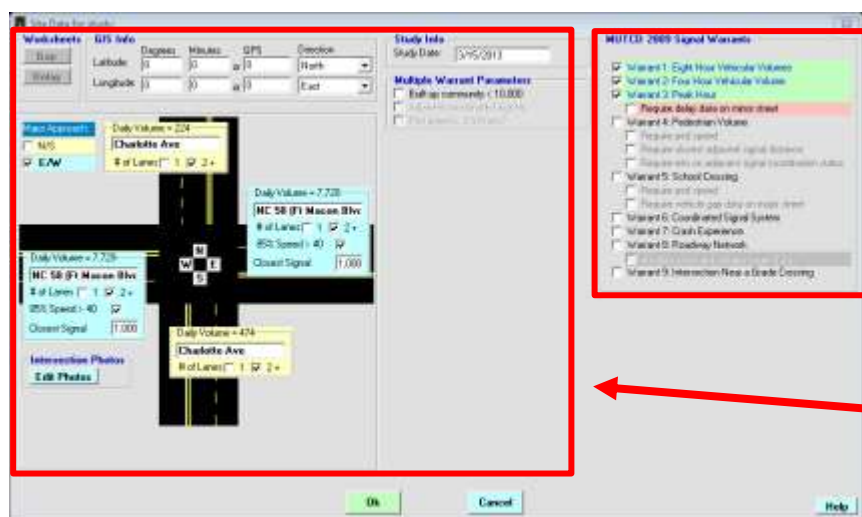
12. Click on the gray button to the left of "Site Data"...



13. Check/uncheck the appropriate speed on the major approaches:



14. Adjust warrants to be evaluated, and add additional data, as needed.

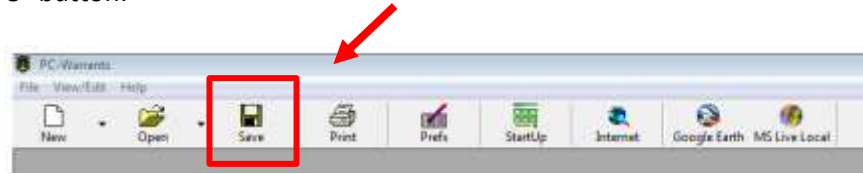


15. When the “Ok” button is green, then enough data is present to evaluate the selected warrants (if the “Ok” button is still red, return to the previous step).

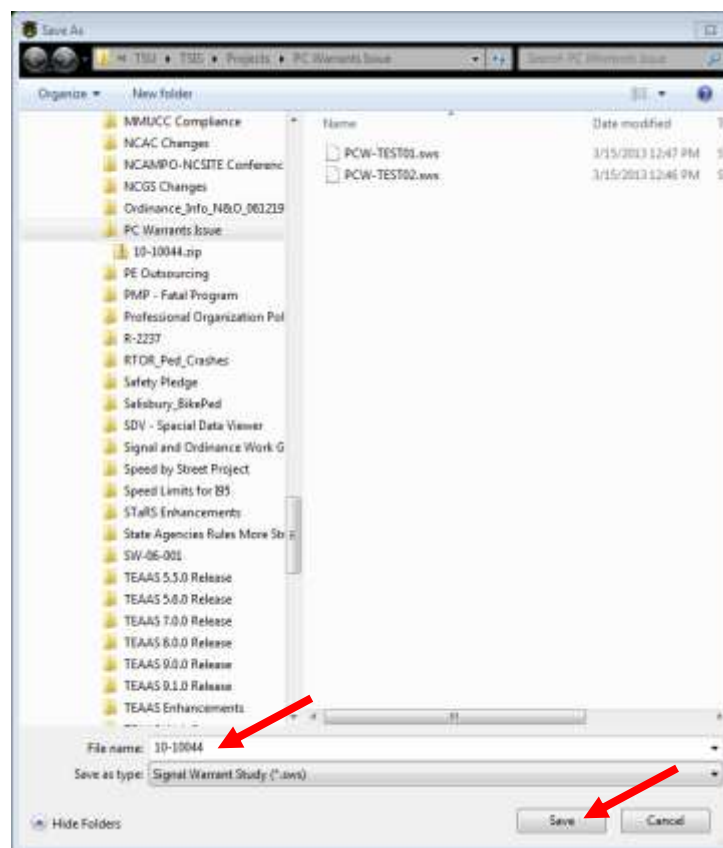


16. Click “Ok”.

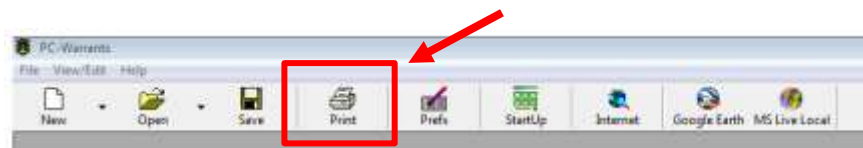
17. Click on the “Save” button:



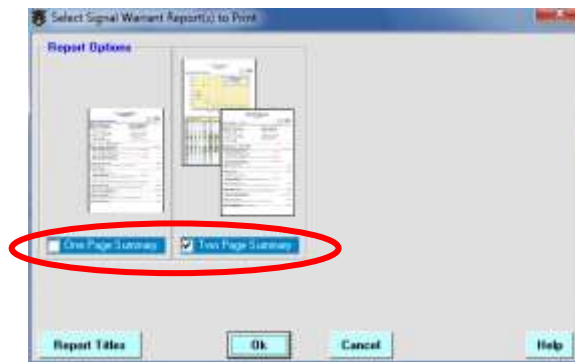
18. Navigate to your usual folder for saving warrant analyses, type in the count number, and click “Save” (this step is necessary for the count number to show up on the reports):



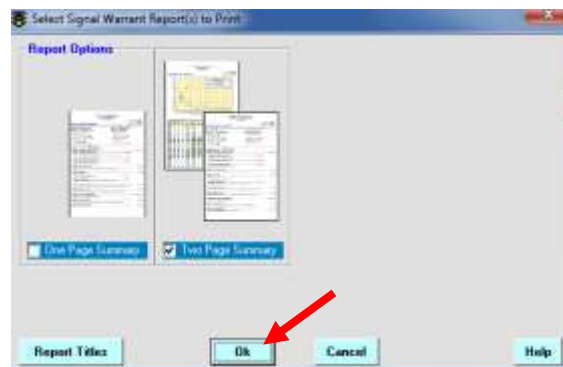
19. To evaluate the selected warrants, click on the “Print” button:



20. Select preferred summary (one page or two pages):

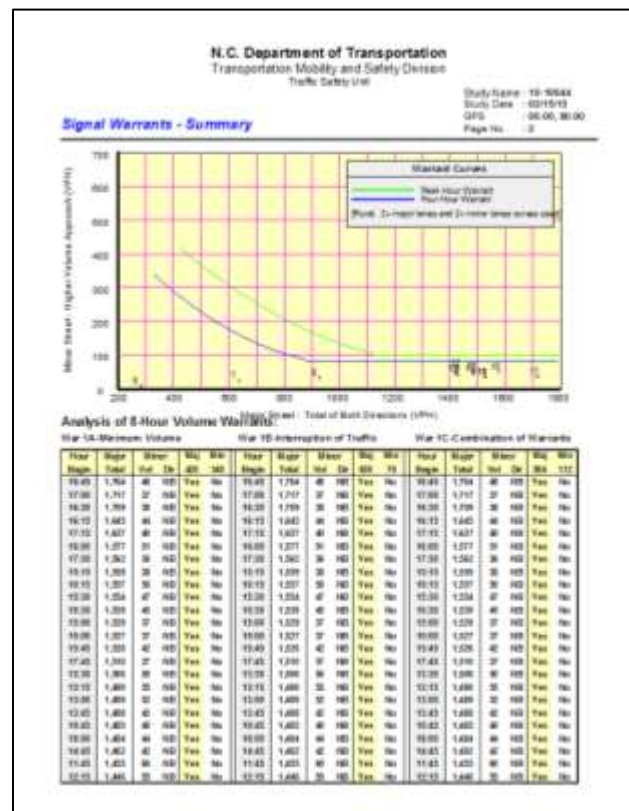


21. Click “Ok” to print view:

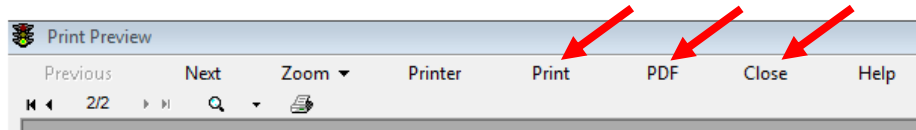


22. [Print preview \(view report\)...](#)

<p align="center">N.C. Department of Transportation Transportation Mobility and Safety Division Traffic Safety Unit</p>		<p>Study Name: 10-00000 Study Date: 03/15/10 GPS: 06.01, 06.02 Page No: 1</p>
Signal Warrants - Summary		
Major Street Approaches		Minor Street Approaches
Eastbound: NC 98 (H Main St) Northbound: Charlotte Ave Number of Lanes: 2 Number of Lanes: 2 85% Speed: 40 MPH Total Approach Volume: 474 Total Approach Volume: 1,070 Southbound: Charlotte Ave Number of Lanes: 2 Number of Lanes: 2 85% Speed: 40 MPH Total Approach Volume: 224 Total Approach Volume: 1,070		
Warrant Summary (Rural values apply)		
Warrant 1 - Eight Hour Vehicular Volume		Not Satisfied
Warrant 1A - Minimum Vehicular Volume Not Satisfied Required volume not met for 8 Hour Date needed		
Warrant 1B - Interruption of Continuous Traffic		Not Satisfied
Required volume not met for 8 Hour Date needed		
Warrant 1AB - Combination of A Warrants		Not Satisfied
Required volume not met for 8 Hour Date needed		
Warrant 2 - Four Hour Volumes		Not Satisfied
Number of Hours (3) volumes exceed minimum + maximum required (4)		
Warrant 3 - Peak Hour		Not Satisfied
Warrant 3A - Peak Hour Daily Not Satisfied Approach volume is not over 400 cars per hour for any hour. Daily data not evaluated		
Warrant 3B - Peak Hour Volumes		Not Satisfied
Volumes do not exceed minimum for any hour		
Warrant 4 - Pedestrian Volumes		Not Evaluated
Warrant 5 - School Crossing		Not Evaluated
Warrant 6 - Coordinated Signal System		Not Evaluated
Warrant 7 - Crash Experience		Not Evaluated
Warrant 8 - Roadway Network		Not Evaluated
Warrant 9 - Intersection Near a Grade Crossing		Not Evaluated



23. Click “Print” to print, “PDF” to save an electronic copy, “Close”, etc.

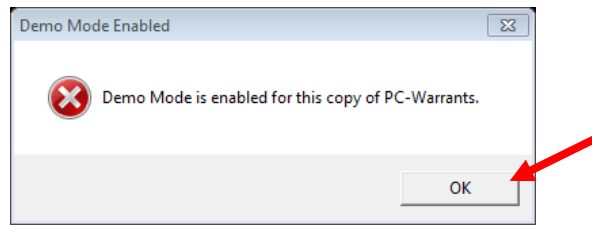


24. Close PC-Warrants.

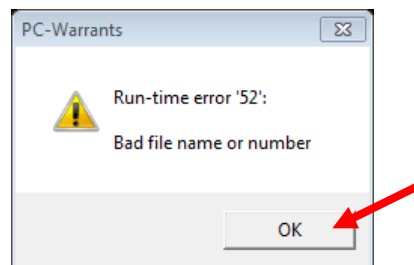
Section C: Run-Time Error 52

This error message sometimes appears when trying to install, upgrade, or open PC-Warrants.

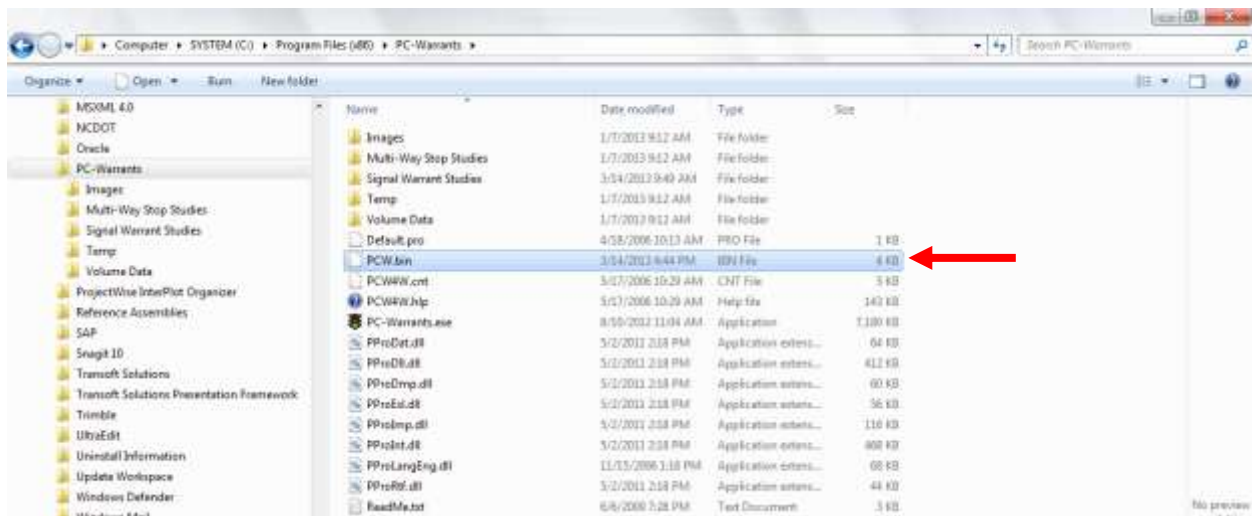
1. Open (double-click) the PC-Warrants icon.
2. Error message “Demo Mode is enabled...” displays – click “OK”.



3. Error message “Run-time error '52': Bad file name or number” displays – click “OK”.



4. Close PC-Warrants.
5. Open Windows Explorer (directory of folders).
6. Navigate to the “C:\Program Files (x86)\PC-Warrants” folder (or the “C:\Program Files\PC-Warrants” folder if you don’t have the “Program Files (x86)” folder) and delete the “PCW.BIN” file.



7. Return to Section A (Installation and Set-Up).

Section D: **Run-Time Error 5**

This is a rare error message that generally only occurs when saving and/or opening Signal Warrant Studies (*.sws) files to/from a remote server. The PC-Warrants vendor indicates that this is usually caused by latency within the network which generates a file fragment and prevents studies from saving or opening correctly. If this error occurs, use Windows Explorer to navigate to the folder where studies are being saved and find and delete any Signal Warrant Studies (*.sws) files that have no size (zero kilobytes, 0 KB).

Section E: **Run-Time Error 9**

This is a rare error message that generally only occurs when saving and/or opening Signal Warrant Studies (*.sws) files to/from a remote server. The PC-Warrants vendor indicates that this is usually caused by latency within the network which generates a file fragment and prevents studies from saving or opening correctly. If this error occurs, use Windows Explorer to navigate to the folder where studies are being saved and find and delete any Signal Warrant Studies (*.sws) files that have no size (zero kilobytes, 0 KB).

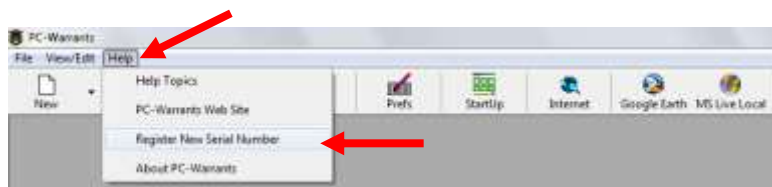
Section F: Licenses (Serial Numbers)

Licenses (serial numbers) for PC-Warrants are site-specific and the same license (serial number) can be used on every machine located at the same physical address. Valid licenses (serial numbers) for each Division/Region office are listed in the following table:

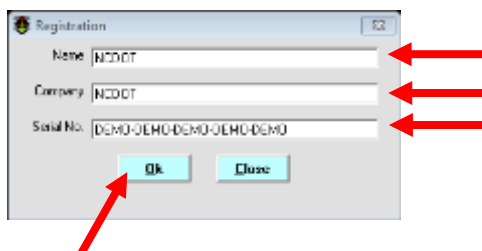
Office	City	Serial Number	Office	City	Serial Number
Division 1	Edenton	EB93-T6PJ-R8HD-9227-7155	Greenfield	Garner	0EF3-XVOT-VHV4-987E-7504
Division 2	Greenville	E1B3-X2DF-206T-989C-7522	Blue Ridge	Fletcher	0233-FFT0-LXN6-989C-7520
Division 3	Castle Hayne	2073-XDVV-XDFL-989C-7523	Cape Fear	Leland	E5C3-HH66-LL68-989C-7516
Division 4	Wilson	F623-RRLO-FVF0-989C-7512	Capital	Garner	1543-LOJX-DXBR-989C-7515
Division 5	Durham	EC13-84BN-NHJD-9227-7159	Eastern/OBX	Wilson	0BC3-TJBB-NTL6-989C-7518
Division 6	Fayetteville	EC43-DTTP-J4DJ-9227-7160	High Country	Shelby	0FB3-HLOT-T4XL-987E-7507
Division 7	Greensboro	DDA3-8P8L-J4RB-9227-7161	Metrolina	Albemarle	0243-6B06-VFTX-989C-7510
Division 8	Aberdeen	0733-LRD0-ZPN4-987E-7508	Sandhills	Fayetteville	0EB3-DJVL-OHRN-987E-7506
Division 9	Winston-Salem	1823-TJRH-NTTX-9227-7163	Triad	Winston-Salem	DEF3-HJ6T-T686-921A-7148
Division 10	Albemarle	0243-6B06-VFTX-989C-7510	Unassigned	N/A	2FA3-ZXZN-HPNX-989C-7511
Division 11	North Wilkesboro	D7A3-8H8F-DD4N-9227-7165	Unassigned	N/A	EC53-V4LR-66F6-987E-7509
Division 12	Shelby	F7A3-R4DN-RPT8-9227-7166	Unassigned	N/A	11D3-FDJ8-HRRP-987E-7505
Division 13	Asheville	EF03-00Z2-0Z2Z-989C-7513	Unassigned	N/A	1A93-HVBN-VDJT-989C-7521
Division 14	Sylva	2CA3-VJBN-HZVV-989C-7514	Unassigned	N/A	0B63-BVOX-FZJ4-989C-7519
			Unassigned	N/A	0343-2JNN-VPB2-989C-7517

If the serial number on your copy of PC-Warrants is not correct for your location, do the following to fix it...

1. Open (double-click) the PC-Warrants icon.
2. Click on "Help" and "Register New Serial Number":

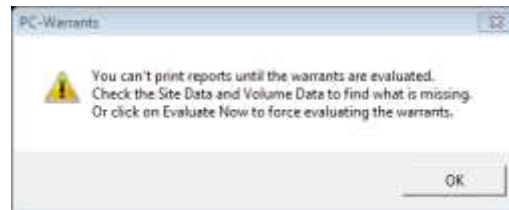


3. Enter "NCDOT" in the "Name" and "Company" fields, replace the existing serial number with the new serial number, and click "OK".



Section G: "Can't Print" Error

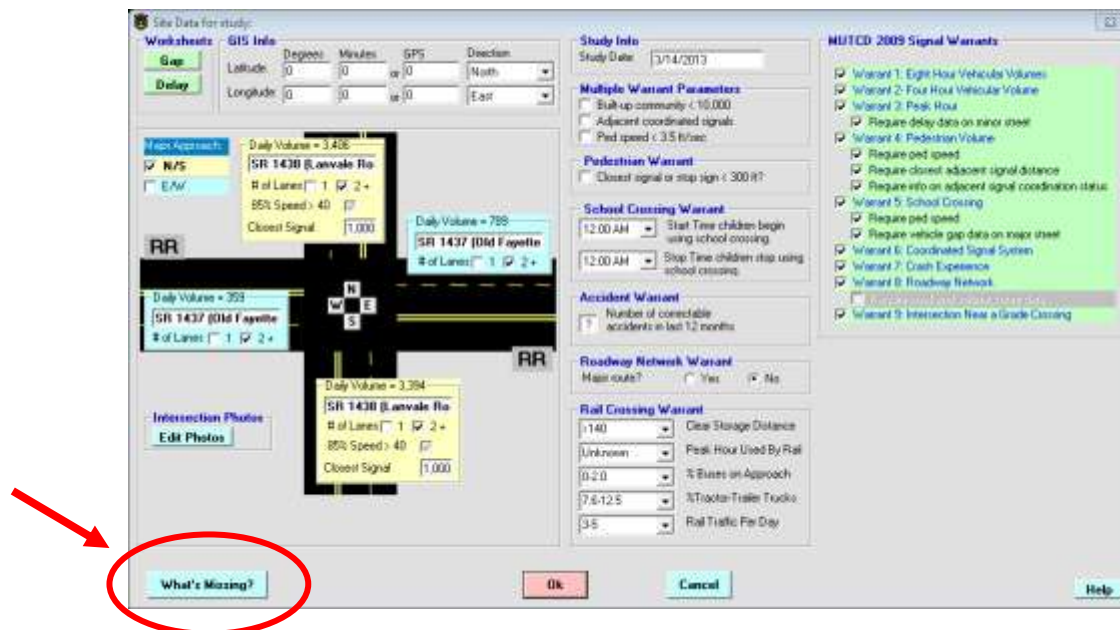
1. Clicking on the "Print" button results in the following error message:



2. This error means that there is not enough data to evaluate some of the selected signals warrants. There is NO LONGER an "Evaluate Now" button – this text is a holdover from previous versions of PC-Warrants. Additional data will need to be entered or some warrants will have to be de-selected. Click "OK" to close the error box.
3. Click on the gray box to the left of "Site Data":



4. Click on the "What's Missing" button:



- This data summary box explains what data is missing for the warrants selected:

Data Required	Status
Approach Name	OK or Not Needed
Approach Speeds	Missing or Incomplete
Volume Data	OK or Not Needed
Delay Data	Missing or Incomplete
Number of Accidents	Missing or Incomplete
Pedestrian Data	Missing or Incomplete
School Crossing Times	Missing or Incomplete
Stop Data	Missing or Incomplete
Approach for Rail Crossing	Missing or Incomplete

Buttons: **Ok**, **Help**

- Enter additional data or unselect warrants as needed:

Enter additional data... →

...or unselect warrants ←

The dialog box contains several sections: **Workbooks** (GIS Info, Map, Data), **Study Info** (Study Date, Multiple Warrant Parameters), **Pedestrian Warrant**, **School Crossing Warrant**, **Accident Warrant**, **Roadway Network Warrant**, **Rail Crossing Warrant**, and **MUTCD 2009 Signal Warrants**. The **Ok** button is currently red.

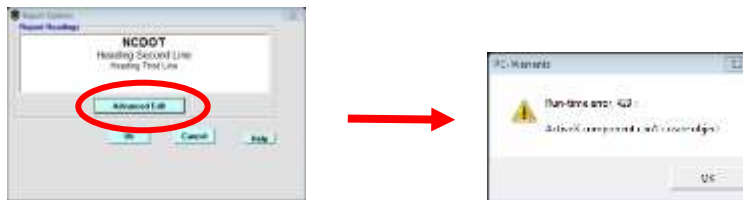
- When the “Ok” button is green, then enough data is present to evaluate the selected warrants. If the “Ok” button is still red, return to the previous step.



- Click “Ok”.

Section H: **Run-Time Error 429**

If the following error message is displayed when clicking on the “Advanced Edit” button while adjusting your report headings...

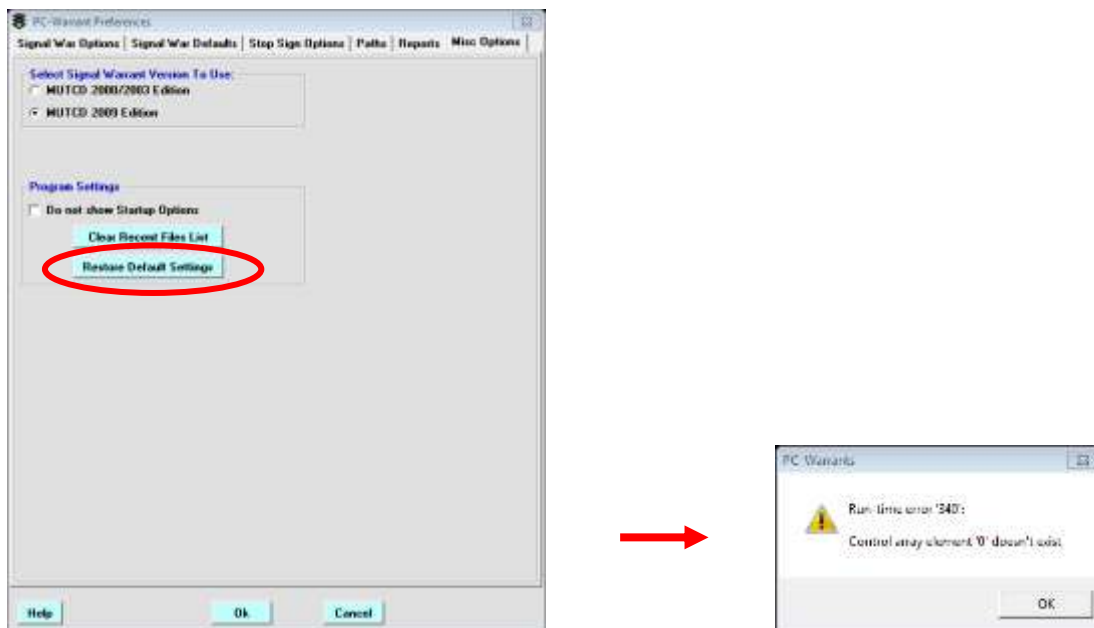


...then do the following:

1. Click “OK” (this will close PC-Warrants).
2. Do not click the “Advanced Edit” button (the vendor is aware of this issue and will have a fix for it in a future version release).

Section I: Run-Time Error 340

If the following error message is displayed after clicking on the “Restore Default Settings” button in the “Misc Options” tab of the preferences box...



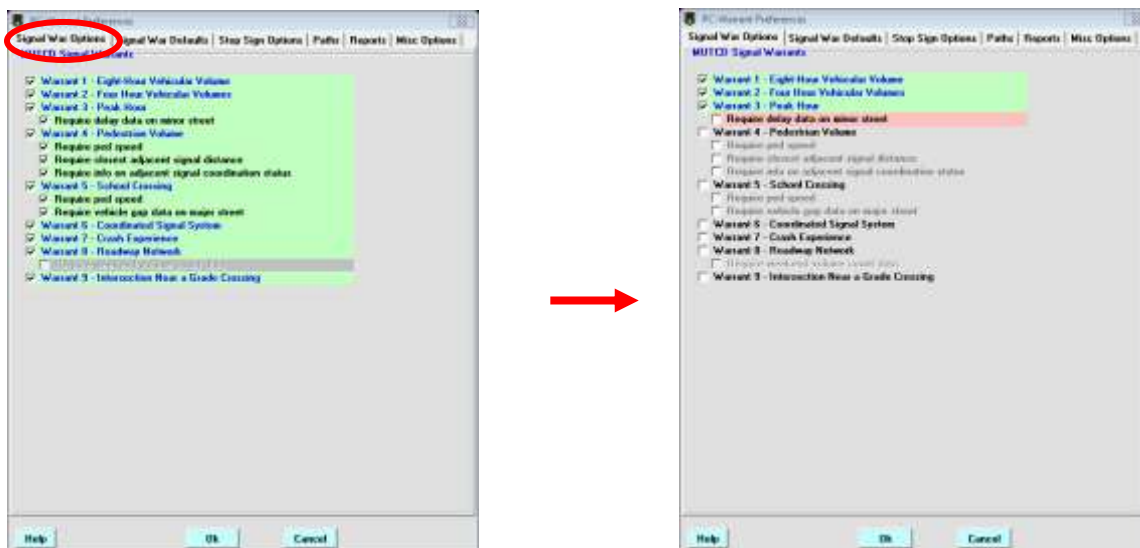
...then do the following:

1. Click “OK” and PC-Warrants will close.
2. Open (double-click) the PC-Warrants icon.
3. The following message will be displayed:

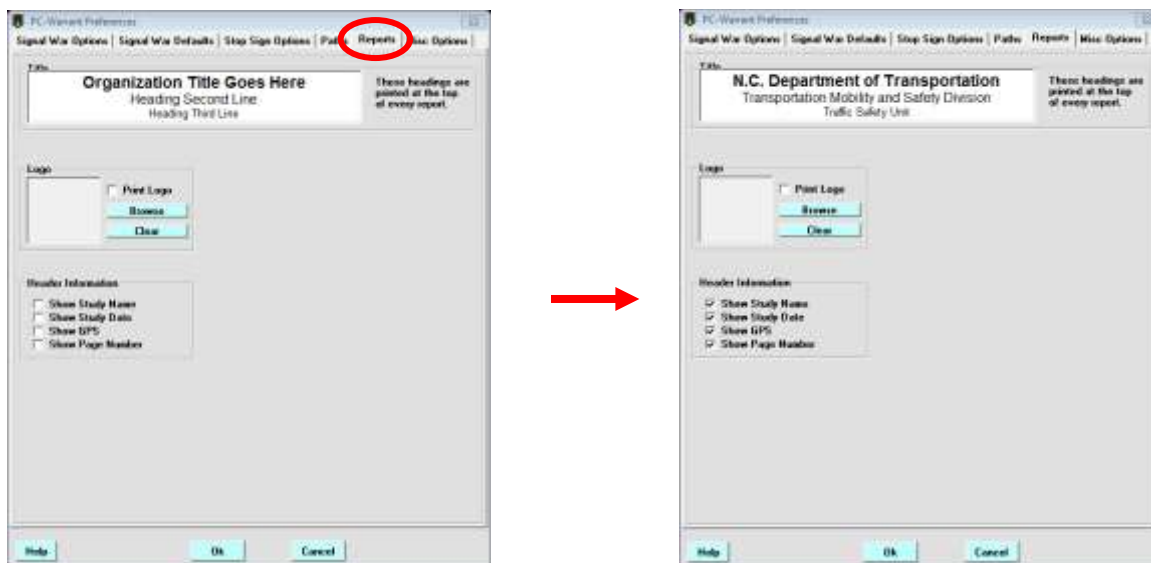


4. Click “OK”.

5. Uncheck everything after “Warrant 3 – Peak Hour” in the “Signal War Options” tab:



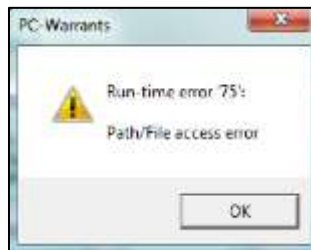
6. Click on the “Reports” tab, enter your default report title (this will print out on all warrant analyses), and check all the boxes in the “Header Information” section:



7. Click “Ok.”
8. Close PC-Warrants.
9. PC-Warrants should now be ready to use.

Section J: **Run-Time Error 75**

If the following error message is displayed (usually when opening PC-Warrants)...



...then have an administrator change the file permissions on the “PC-Warrants” folder to allow access to all users.